

# Work Order ID 64548



Page 1

Wednesday, December 08, 2010 10:11:44 A

Item ID: D3315-1

Accept



Setup Start



Revision ID:

Item Name: Wearplate

Stop



Start Date: 12/8/2010 Start Qty: 7.00



Cust Item ID:

Required Date: 12/22/2010 Req'd Qty: 7.00



Customer:

Reference:

Approvals:

Process Plan:

Date: 10/12/8

Tooling:

Date:

Run Start



QC:

Date:

SPC (Y/N):

Date:

Stop



Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty :	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	---------	--------	--------------	-----------------	---------------	------------------	----------------

Draw Nbr	Revision Nbr
----------	--------------

D3315	Rev B
-------	-------

100



FLOW WATER JET

Waterjet

FLOW CNC Waterjet  
1010 . 003

Memo

0.00

10/10-12-22

(7)

110



QC2- Inspect parts off machine FAI/FAIB

QC

Quality Control

Memo

0.00

10/10-12-22

120



QC8- Inspect parts - second check

QC

Quality Control

Memo

0.00

0.00

S 1012123

(X7)

**Work Order ID 64548**

Page 2

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Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run

Start



QC:

Date:

SPC (Y/N):

Date:

Stop

Sequence ID/  
Work Center ID

130

Operation  
DescriptionSet Up/  
Run Hours

Tool ID

Tool #

Plan  
CodeAccept  
QtyReject  
QtyReject  
NumberInsp.  
Stamp

Small Fab

Small Fab

0.00



Small Fab

Memo

0.00

Deburr if necessary

N/A8

140



NC BRAKE

0.00

Brake NC

Memo

0.00

Brake NC

1- Form using DT8751 Die as per Dwg D3315Rev: B  2- Form using DT8179 Die and form joggle using DT8157 as per Dwg D3315Rev: B

SB 10/01/03

(7)

150



QC6- Inspect dimensions to drawing

0.00

QC

Memo

0.00

Quality Control

S 10/01/03



1

**Work Order ID 64548**

Wednesday, December 08, 2010 10:11:44 A



Page 3

Item ID: D3315-1

Revision ID:

Item Name: Wearplate

Start Date: 12/8/2010 Start Qty: 7.00

Required Date: 12/22/2010 Req'd Qty: 7.00

Accept



Setup Start



Stop



Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run

Start



QC:

Date:

SPC (Y/N):

Date:

Stop

Sequence ID/  
Work Center IDOperation  
DescriptionSet Up/  
Run Hours

Tool ID

Tool #

Plan  
CodeAccept  
QtyReject  
QtyReject  
NumberInsp.  
Stamp

160



Large Fab

0.00

EL 16-1-5 (X7)

Large Fab

Memo

0.00

Large Fab

Weld hard surface using D3315-1T3 as per QSI 004 and Dwg D3315 Rev:

<input checked="" type="checkbox"/> Qty	Part Number	Description	Batch	A/R
N/A	7560	Hardcoat Rod	<u>M115552</u>	

170



QC10- Inspect visual per QSI004- ground welds

0.00

S. Salas

Quality Control

0.00

180



QC5- Inspect part completeness to step on W/O

0.00

QC

Quality Control

Memo

0.00

S. Salas

(X7) -1

**Work Order ID 64548**

Page 4

Wednesday, December 08, 2010 10:11:44 A

Item ID: D3315-1

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Setup Start



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Cust Item ID:

Required Date: 12/22/2010 Req'd Qty: 7.00



Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run Start



QC:

Date:

SPC (Y/N):

Date:

Stop

Sequence ID/  
Work Center IDOperation  
DescriptionSet Up/  
Run Hours

Tool ID

Tool #

Plan  
CodeAccept  
QtyReject  
QtyReject  
NumberInsp.  
Stamp

190



Powdercoat

Grey Sandtex(Ref:4.3.5.6) per QSI005 4.3

M112588

0.00

JL BK 11-01-6

Powder Coating

Memo

0.00

START TIME:

10:20

OVEN TEMPERATURE:

FINISH TIME:

10:50

200



QC3- Inspect Part Finish

0.00

=JL

11/01/06

JL

QC

Memo

0.00

Quality Control

210



Packaging

0.00

11/1/06 JL

Packaging

Memo

0.00

Identify on inside surface using a permanent fine point marker with the following: TCCA-PDA, Dart Aerospace Ltd. P/N: D3315-1, B/N: BXXXXXX For Product Eligibility see PDA04-17 and Stock Location: 495

**Work Order ID 64548**

Wednesday, December 08, 2010 10:11:44 A



Page 5

Item ID: D3315-1

Revision ID:

Item Name: Wearplate

Start Date: 12/8/2010 Start Qty: 7.00

Required Date: 12/22/2010 Req'd Qty: 7.00

Accept



Setup Start



Stop



Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run

Start



QC:

Date:

SPC (Y/N):

Date:

Stop

Sequence ID/  
Work Center ID

220



QC

Quality Control

Operation  
Description

QC21- Final Inspection - Work Order Release

Set Up/  
Run Hours

0.00

Tool ID

Tool #

Plan  
CodeAccept  
QtyReject  
QtyReject  
NumberInsp.  
Stamp

Memos

0.00

*CK 11/01/07*  
*MK*  
*11-01-06*

# Picklist Print

Wednesday, December 08, 2010 10:11:49 AM

Page 1

Work Order ID: 64548



Parent Item: D3315-1



Parent Item Name: Web plate

Start Date: 12/8/2010

Required Date: 12/22/2010

Start Qty: 7.00

Required Qty: 7.00

Comments: IPP: A□05.05.12□New issue□KJ/JLM  
IPP Rev:B As per Rev B 06-03-24 JLM□  
IPP Rev:C now water jet 07-12-06 DD

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
M1010S16GA		Purchased		No		100	sf	84.5250	1.695	12.35938		1810-12-22	



1010/1025 sheet 16GA

Location	Loc Qty	Loc Code
MAT19	84.525	
111410	84.525	111410

(7)

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

DART AEROSPACE LTD	Work Order:	641548
Description: Wearplate	Part Number:	D3315-1
Inspection Dwg: D3315 Rev: B		Page 1 of 1

### FIRST ARTICLE INSPECTION CHECKLIST

First Article     Prototype

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
Ø0.266 x 0.450	+0.006/-0.001 x +/-0.010	267X453 X	X	X	V HB02	
4.402	+/-0.010	4.400 X	X	X	V	
4.137	+/-0.010	4.137 X	X	X	V	
3.550	+/-0.010	3.557 X	X	X	V	
5.464	+/-0.010	5.466 X	X	X	V	
5.214	+/-0.010	5.215 X	X	X	V	
1.224	+/-0.010	1.224 X	X	X	V	
2.57	+/-0.030	2.560 X	X	X	V	
6.273	+/-0.010	6.266 X	X	X	V	
8.224	+/-0.010	8.224 X	X	X	T HB01	
9.515	+/-0.010	9.515 X	X	X	T	
11.429	+/-0.010	11.429 X	X	X	T	
15.474	+/-0.010	15.474 X	X	X	T	
16.379	+/-0.010	16.379 X	X	X	T	
21.360	+/-0.010	21.360 X	X	X	T	
23.474	+/-0.010	23.474 X	X	X	T	
26.273	+/-0.010	26.273 X	X	X	T	
29.42	+/-0.030	29.42 X	X	X	T	
0.060	+/-0.010	.057 X	X	X	V	
Ø0.300	+0.006/-0.001	.300 X	X	X	V	

Measured by:	B	Audited by:	S	Prototype Approval:	N/A
Date:	10-12-22	Date:	10/12/23	Date:	N/A

Rev	Date	Change	Revised by	Approved
A	09.09.28	New Issue	KJ	M

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

SHOP COPY

RETURN TO

ENGINEERING

UNCONTROLLED COPY

SUBJECT TO AMENDMENT

WITHOUT NOTICE

WORK ORDER

NO CH15418

*B10-12-8*

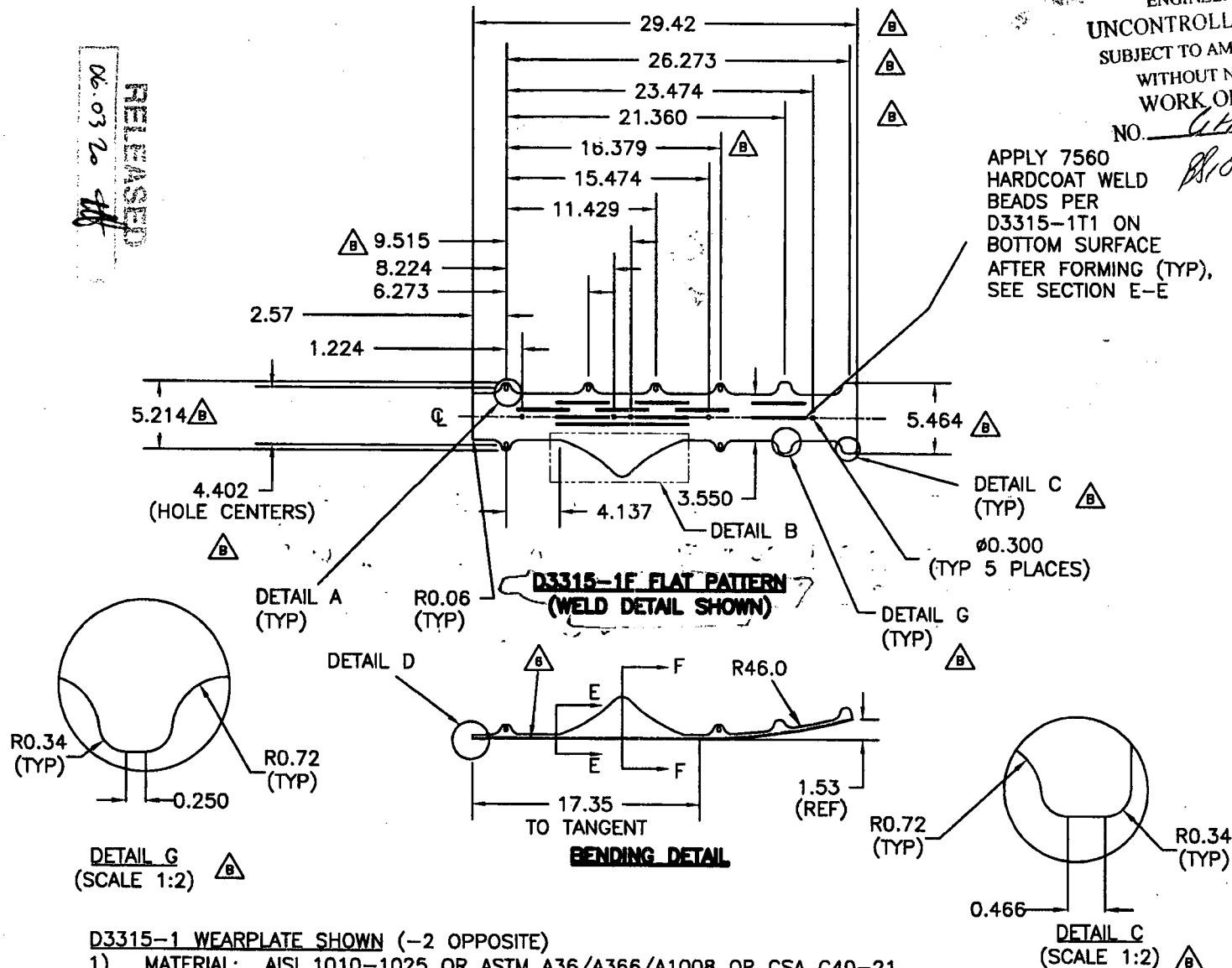
**DART**

RELEASED  
06.03.10

*MF*

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**D3315-1 WEARPLATE SHOWN (-2 OPPOSITE)**

- 1) MATERIAL: AISI 1010-1025 OR ASTM A36/A366/A1008 OR CSA G40-21, 38W/44W/50W/60W/70W SERIES STEEL 16 GAUGE (0.060 THICK)
  - 2) FINISH: POWDER COAT GREY SANTEX (REF.4.3.5.6) PER DART QSI 005 4.3
  - 3) WELD PER DART QSI 004
  - 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
  - 5) ALL DIMENSIONS ARE IN INCHES
  - 6) IDENTIFY ON INSIDE SURFACE AS INDICATED
- \*TCCA-PDA, DART AEROSPACE LTD., P/N D3315-X  
B/N BXXXXX, FOR PRODUCT ELIGIBILITY SEE PDA05-17"

DESIGN PH	DRAWN BY PH	DART AEROSPACE LTD	
CHECKED	APPROVED	DRAWING NO.	REV. B
DATE		D3315	SHEET 1 OF 4
06.01.31		A 04.09.10 NEW ISSUE	
		B 06.01.31 UPDATE DIMENSIONS	1:12 SCALE

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

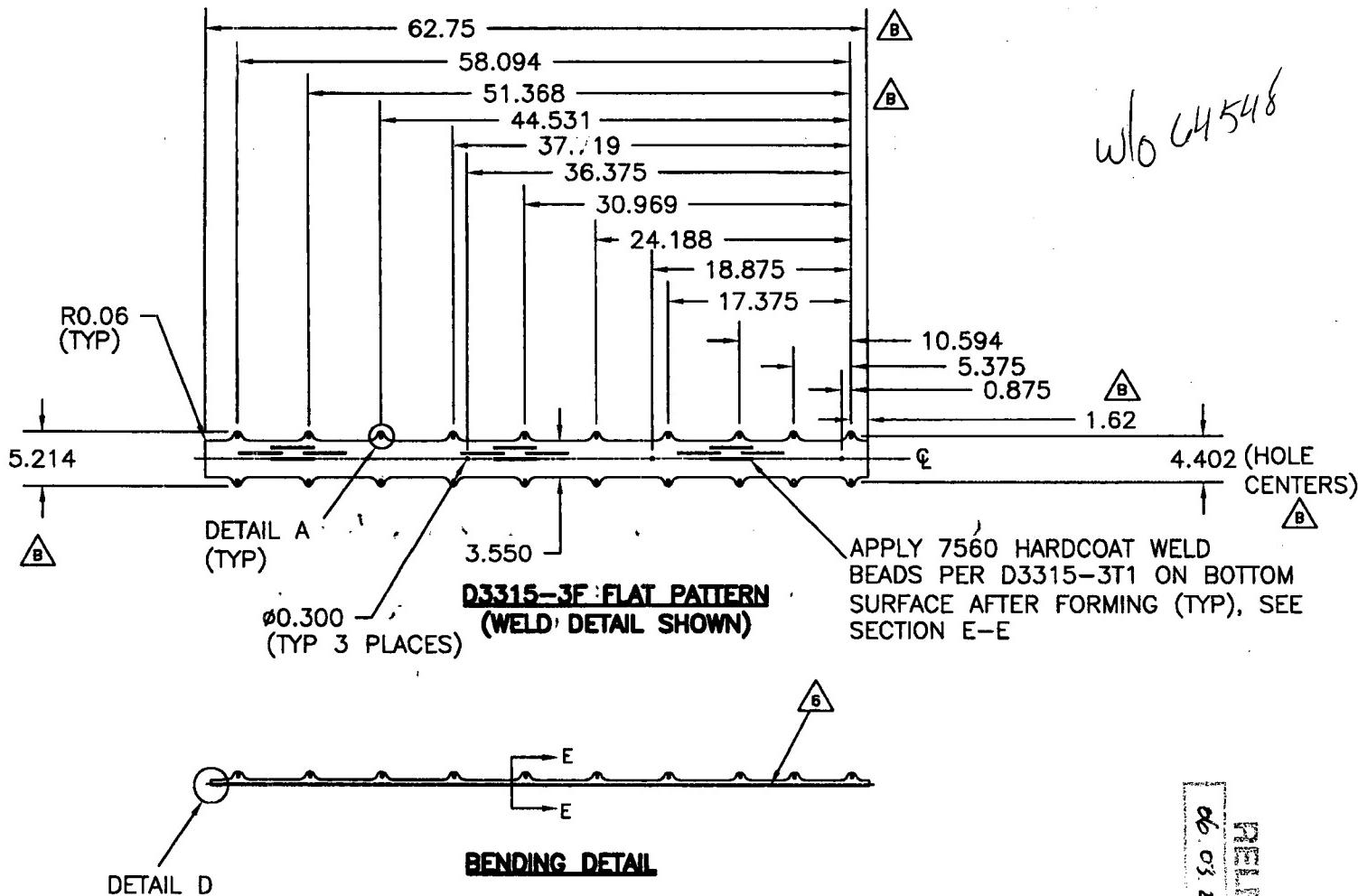
Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

**DART**

DESIGN	P/H	DRAWN BY	P/H	DART AEROSPACE LTD
CHECKED	<i>[Signature]</i>	APPROVED	<i>[Signature]</i>	HAWKESBURY, ONTARIO, CANADA
DATE	06.01.31	DRAWING NO.	D3315	REV. B SHEET 2 OF 4
TITLE	WEARPLATE	SCALE	1:16	



D3315-3 WEARPLATE SHOWN (-4 OPPOSITE)

- 1) MATERIAL: AISI 1010-1025 OR ASTM A36/A366/A1008 OR CSA G40-21, 38W/44W/50W/60W/70W SERIES STEEL 16 GAUGE (0.060 THICK)
- 2) FINISH: POWDER COAT GREY SANTEX (REF.4.3.5.6) PER DART QSI 005 4.3
- 3) WELD PER DART QSI 004
- 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 5) ALL DIMENSIONS ARE IN INCHES
- 6) IDENTIFY ON INSIDE SURFACE AS INDICATED  
"TCCA-PDA, DART AEROSPACE LTD., P/N D3315-X  
B/N BXXXXX, FOR PRODUCT ELIGIBILITY SEE PDA05-17"

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

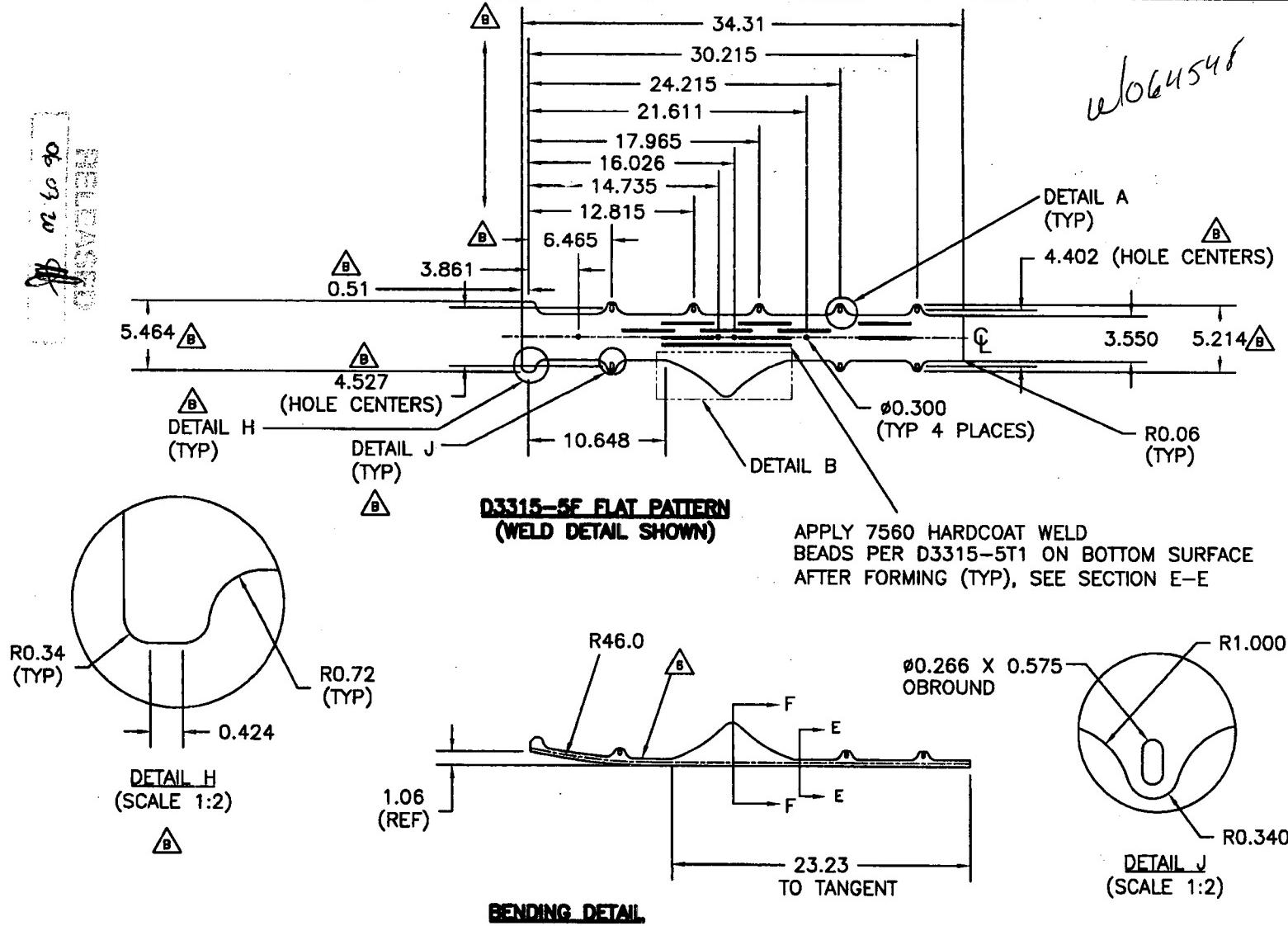
Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

**DART**

DESIGN	P/H	DRAWN BY	P/H	DART AEROSPACE LTD
CHECKED	<input checked="" type="checkbox"/>	APPROVED	<input checked="" type="checkbox"/>	HAWKESBURY, ONTARIO, CANADA
DATE	06.01.31	DRAWING NO.	D3315	REV. B
TITLE	WEARPLATE	SCALE	1:12	SHEET 3 OF 4



**D3315-5 WEARPLATE SHOWN (-6 OPPOSITE)**

- 1) MATERIAL: AISI 1010-1025 OR ASTM A36/A366/A1008 OR CSA G40-21, 38W/44W/50W/60W/70W SERIES STEEL 16 GAUGE (0.060 THICK)
- 2) FINISH: POWDER COAT GREY SANTEX (REF.4.3.5.6) PER DART QSI 005 4.3
- 3) WELD PER DART QSI 004
- 4) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 5) ALL DIMENSION ARE IN INCHES
- 6) IDENTIFY ON INSIDE SURFACE AS INDICATED  
"TCCA-PDA, DART AEROSPACE LTD., P/N D3315-X  
B/N BXXXXX, FOR PRODUCT ELIGIBILITY SEE PDA05-17"

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

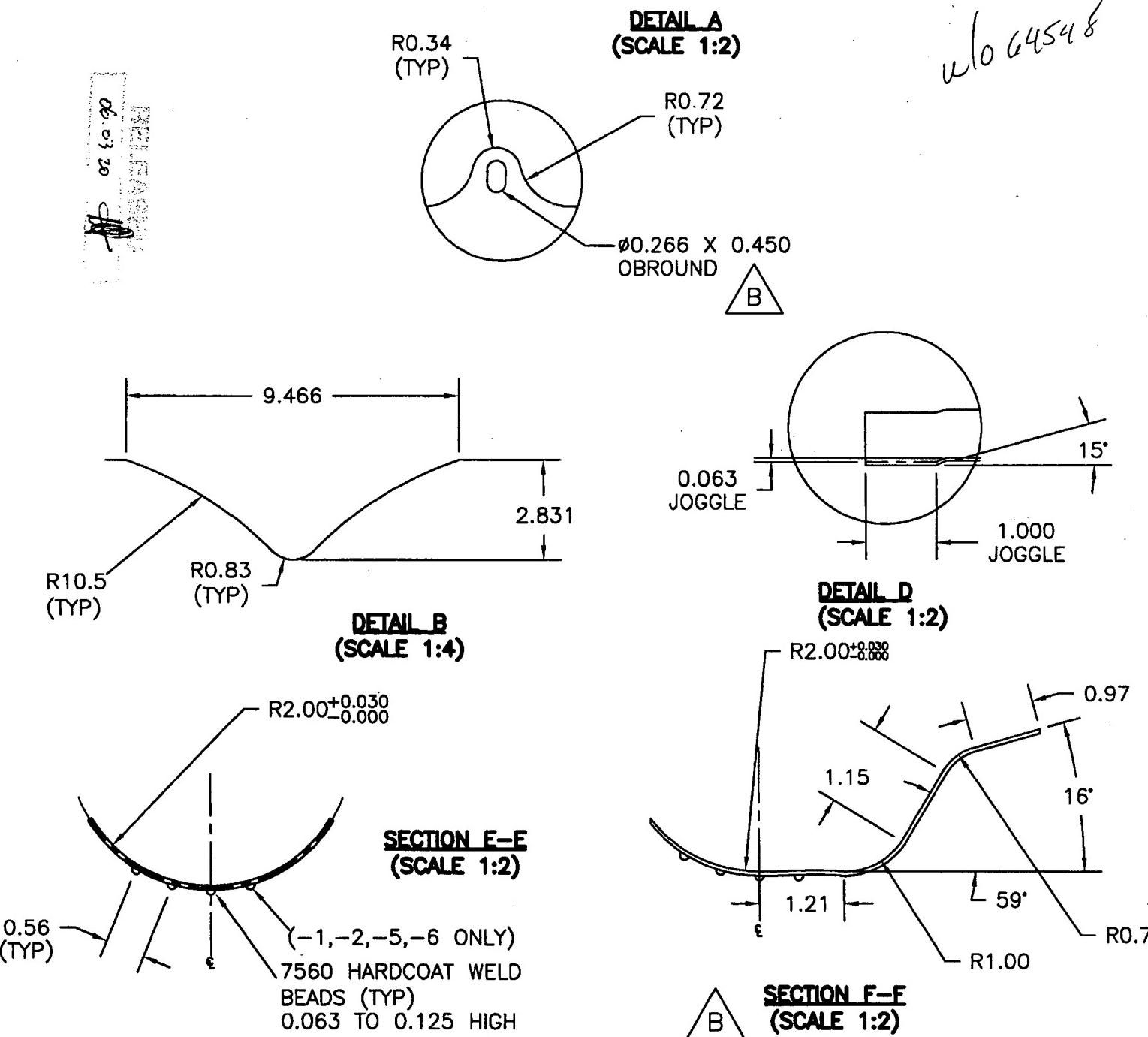
Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

**DART**

DESIGN <i>PH</i>	DRAWN BY <i>PH</i>	DART AEROSPACE LTD	
CHECKED <i>H</i>	APPROVED <i>H</i>	DRAWING NO. D3315	HAWKESBURY, ONTARIO, CANADA
DATE 06.01.31	TITLE WEARPLATE	SHEET 4 OF 4	REV. B
NTS	SCALE NTS	SCALE NTS	SCALE NTS



W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries